CLAIMS

1. A woven fabric including in its woven construction a first elongated electrical conductor crossed by a second elongated electrical conductor, said conductors being permanently biased apart at the crossover point.

2. A fabric according to claim 1, having a plurality of spaced first conductors and/or a plurality of spaced second conductors thereby forming a plurality of said crossover points.

3. A fabric as claimed in claim 1 or 2, wherein the conductors comprise electrically conductive filaments or fibres.

4. A fabric as claimed in claim 3, wherein the warp includes at least one said first electrical conductor and the weft includes at least one said second electrical conductor.

5. A fabric as claimed in any one of claims 1 to 4, including insulating fibres or filaments which bias the first and second electrical conductors apart at a crossover point.

6. A fabric as claimed in claim 5, wherein the woven structure includes warp and/or weft floats over or under more than one yarn to effect the biasing apart of first and second electrical conductors at a crossover point.

7. A fabric as claimed in claim 6, wherein the first and/or second electrical conductor is subject to a warp and/or weft float over or under more than one yarn.

8. A fabric as claimed in claim 6 or 7, wherein the neighbouring insulating warp fibres to an electrical conductor in the warp are subject to a warp float over or under more than one weft yarn.

9. A fabric as claimed in any of claims 6 to 8, wherein the neighbouring insulating weft fibres to an electrical conductor in the weft are subject to a weft float over or under more than one warp yarn.

10. A fabric as claimed in any of claims 7 to 9, which employs during the weaving thereof separate shafts for an electrical conductor in the warp and the insulating fibres in the warp that are neighbouring to said electrical conductor.

11. A fabric as claimed in any of claims 5 to 10, wherein said biasing apart is effected by locating an electrical conductor of relatively smaller cross-section between neighbouring insulating filaments or fibres of relatively larger cross-section.

12. A fabric as claimed in any of claims 6 to 11, including at least one instance of a crossover point at which the first and second electrical conductors are permanently biased apart and at least one instance of a crossover point at which the corresponding first and second electrical conductors are permanently physically connected together.

13. A fabric as claimed in claim 12, wherein the one or more crossover points at which the corresponding first and second electrical conductors are permanently physically connected together are effected by means of a plain weave structure local to that crossover point.

14. A fabric as claimed in claim 12 or 13, including one or more permanently connected crossover points and one or more permanently biased apart crossover points in order to bring into being at least one conductive path within the fabric that is composed of two or more contiguous segments of two or more electrical conductors.

15. A fabric as claimed in claim 14, wherein the two or more contiguous segments are of two or more electrical conductors that exhibit differing linear resistivities.

16. A fabric as claimed in claim 14 or 15, wherein the lengths and/or number and/or arrangement and/or linear resistivities of the contiguous segments of electrical

conductors are so chosen as to constitute one or more resultant conductive paths that conform to a required geometry and/or a required electrical characteristic and/or a required value of electrical property.

17. A fabric as claimed in claim 16, wherein the required electrical property is electrical resistance, capacitance, inductance, impedance or reactance.

18. A fabric as claimed in claim 16 or 17, wherein the required electrical characteristic is a heterogeneous distribution of resistance along the resultant conductive path and/or across the fabric.

19. A fabric as claimed in any of the preceding claims, wherein the fabric provides an electrical heating element.

20. A fabric as claimed in claim 18, wherein the fabric provides an electrical heating element that exhibits a heterogeneous distribution of heated power dissipation along the resultant conductive path and/or across the fabric.

21. A fabric as claimed in any of the preceding claims, wherein the fabric provides an electrical sensor or transducer by means of measurement of some electrical property of a conductive path.

22. A fabric as claimed in claim 21, wherein said measured electrical property includes, but is not limited to, one or more of the properties resistance, capacitance, inductance, impedance and reactance.

23. A fabric as claimed in claim 21 or 22, wherein the fabric provides an electrical sensor for temperature and wherein the measured electrical property is resistance.

24. A fabric as claimed in any of claims 17 to 23, wherein the fabric provides an electrical heating element and an electrical sensor for temperature.

25. An electrical circuit or structure within a textile including a plurality of one or more of conductive, resistive and insulative elements which are pressure actuated into contact, which are permanently unconnected and/or which a fully conductive.

26. A fabric comprising cross-over weave structures providing two or more mutually separated bus bars to be incorporated into the fabric during the weaving process.